Patients with CV risk factors alone

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Over 80% of patients with type 2 diabetes (T2D) have hypertension, dyslipidemia, or overweight/obesity. T2D alone has been deemed as myocardial infarction-equivalent disease and is listed in the moderate risk category of European Society of Cardiology guideline, with any more additional risk factors escalating the category to high or very high risk. Checkups using ECG, microalbuminuria, coronary calcium score, myocardial perfusion scan, or even coronary CT in DM patients with additional CV risk factors may be beneficial because of high prevalence of silent ischemia. In general, current major guidelines have suggested that T2D patients should more aggressively control risk factors to the pre-set goals through lifestyle intervention, adequate antihypertensives, and moderate to high intensity statins. Certain classes of antihyperglycemic agents, such as GLP-1 receptor agonists and SGLT-2 inhibitors, having been proven to have cardiovascular (CV) benefits beyond glucose reduction, may be particularly suitable for glycemic control in patients with high CV risk factors. In addition, these agents also have relatively low risk of inducing hypoglycemia, which has a substantial impact on overall mortality. It's still an issue of debate regarding whether aspirin is useful in the primary prevention for T2D patients with CV risk factors. Growing evidence has showed that it reduces CV composite endpoint by ~ 12%, but substantially increases risk of major bleeding. In the newly released 2019 ACC/AHA and ESC/EASD guideline, low-dose aspirin for the primary prevention in patients with high CV risk is only a IIb recommendation confined in those without increased bleeding, particularly gastrointestinal bleeding, risk, and whose age < 70 years. Routine use of aspirin for the primary prevention in DM patients without high or very high CV risk is not recommended (class III).